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Arrangement of financing for highway infrastructure projects under the conditions of Public–Private Partnership

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ABSTRACT

This study focused on the mechanism of attracting funds to finance projects in the field of highway infrastructure construction through Public–Private Partnership (PPP). The basis and principles for development of the financial strategy of a project company were defined in this paper. The proposed financial strategy was developed on the basis of diversification of sources of funds and financing instruments with regard to the stages of the project life cycle. The parameters for development of the financial strategy were defined to improve the mechanisms of attraction of the capital for the project and increase the capacity of the project company to pay debts. The proposed financial strategy can be taken as a basis for development of the financial strategy for any project implemented through PPP. The capital market is not stable; therefore, in addition, an algorithm was proposed for more precise selection of sources of financial resources.

1. Introduction

Available funding for infrastructure from traditional sources falls far short of the investment needs [1]. However, the state shall not be solely responsible for resolution of problems connected with the development of highway infrastructure. Implementation of projects under the conditions of Public–Private Partnership (PPP) is a promising mechanism for attracting private funds. PPP is a legally executed mutually beneficial cooperation of public bodies and authorities with business entities in respect to projects that are in the field of direct state interest and control for a certain period of time. Around the world, PPPs have become an increasingly popular means for procuring public services and infrastructure [2]. It is mainly due to the fact that PPPs allow governments to secure a much-needed infrastructure without immediately raising taxes or borrowing [3]. Under such conditions, the study of the structure and mechanisms of financing of PPP projects is particularly important.

As the gap between the growing demands for public services and infrastructure, on the one hand, and financial and budgetary constraints, on the other hand, is constantly widening, the government is interested in implementing PPP projects if a private partner is liable for financial obligations. The Public Authority also needs to understand the implications of the financing structure for PPP contract as a whole, both as to the payment structure and long-term flexibility and the cost of early termination of the PPP contract, taking any financial hedging into account [4]. The task of financing requires the sponsors to decide the capital structure of the project: how much should be provided by the sponsors in the form of equity financing and how much should be borrowed from lenders in the form of debt financing, especially on a non- or limited recourse basis [5].

The financial strategy for the project company to raise capital plays a crucial role, as it directly affects the amount of capital expenditures that take the biggest part in the cost structure of the project. The process of creating a financial strategy for the project company from design to approval is time-consuming and costly. Therefore researchers offered some suggestions on this problem. However, they did not suggest any completed design or strategy for attracting funds for the project.

The accumulation of capital for a project requires a developed funding approach. It includes the following components: the identification of the capital sources, sources of repayment of capital costs, and the legal person responsible for project financing. Scientists and researchers use other terms instead of the 'funding approach'. Yescombe [4] used the terms 'PPP models' and studied purely private financing for the project (project or corporate financing) or alternative PPP models with private and public funding. Delmon [6], Daderkina [7] and some other scholars used the term 'sources of financing' and highlighted three of the most common sources of financing for infrastructure projects, such as Government financing, Corporate financing, and Project financing . Researchers from Public–Private Infrastructure Advisory Facility[1] (PPIAF) analyzed methods to finance public service

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[1] PPIAF is a multi-donor trust fund that also supports governments to develop specific infrastructure projects with private sector participation http://www.ppiaf.org/.

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infrastructure. These are public budget finance and investment prefinancing by the project sponsors, and an alternative to these methods, Project Finance [8]. Karpov [9] and Varnavsky [10] noted that, at the present time in the world practice there are known tools that allow companies created on the Public–Private Partnership basis, to raise funds from various financial institutions for implementation of large investment programs by means of complex financing schemes, insurance, cross-guarantees and redistribution of risks. Summarizing the research in the field of funding approach to raising capital for PPP projects, we should point out the researchers' consensus and admit that we share their point of view as well: the Project Financing takes the most significant position and is the most flexible, rational and promising long-term type of financing of large PPP projects.

There are three categories of funds used for financing a project: equity, subordinated debt and senior debt. Many authors define these concepts as sources of funding or source of capital, and at the same time, they use the same term for legal entities, organizations, and institutions, which contribute to project capital. We use the definition of Ye [5] and define, in this case, the capital categories. The analysis of such categories as equity and senior debt in the financing of PPP projects shows that the authors have the same opinion in understanding and characterizing these two categories. Describing them from the perspective of the risk degree and level of the expected income, we see that these are two diametrically opposite extreme categories of capital. Financial instruments being under the notion of subordinated debt are debt fund obligations that are paid after the senior debt and before the payment of dividends on common shares of the company. Financial instruments which are used for the accumulation of funds within the scope of each category are presented in Fig. 1.

Sponsors of the project, banks, pools of banks, international financial institutions, any counterparty of the project company, and the budgets of different levels can be sources of funds. They can provide for the project capital from different categories and use one or several financial instruments. For example, sponsors provide capital and subordinated loan for the project. A number of authors have noted this possibility, describing the advantages and disadvantages of financial instruments. However, they did not recommend any financial strategy for the project company to raise capital, only giving limited recommendations for the selection of a particular tool.

A PPP project differs from an investment project in the following way: governments carry out different functions under the partnership that largely determines the success of the project. They partially fund infrastructure projects, provide the institutional environment for the project implementation and organizational structure, and reduce risks by guaranteeing repayment of the loan both directly and indirectly. However, some authors have noted there is a danger that the state guarantees conceal the financing costs [11]. In practice, the state depending on the socio-economic significance of the project uses financial instruments in various combinations. As a result, it manages to soften and neutralize many risks, including commercial risks [12].

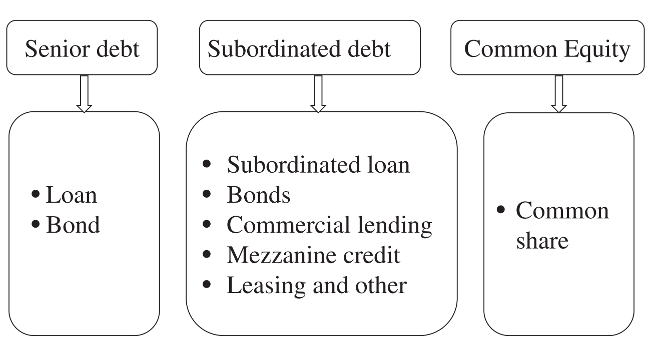

Fig. 1. Financial instruments for project financing.

The authors give some suggestions on how to attract capital for projects. Their opinions about the criteria for choice of source are different and do not contain any complete plan or general financial strategy for the project company to attract funds for the project. The absence of developed options for financial strategies for raising funds for PPP projects in the scientific literature can be justified by the uniqueness of PPP projects. Indeed, as a rule, PPP projects are unique but they have similar industry-wide features. Moreover, their implementation takes place according to the standard scenario. Therefore, the purpose of this paper is to develop and substantiate a typical financial strategy for raising capital for projects of highway infrastructure implemented through Public–Private Partnership. For this purpose, we must substantiate the assumed capital structure of the project. Then we must determine the influence of typical projects, highway infrastructure characteristics and conditions of the PPP on the possibility of accumulation of capital in accordance with the target structure. The next step is the detection of the approach to funding the project, which, in such case, allows accumulating funds following the target capital structure. Then we define the basis and principles for determination of the sequence and scope of funds to be raised from various sources, and the financial instruments to be applied. Based on the abovementioned, we propose a financial strategy for the project company for PPP projects in the sector of highway infrastructure.

2. Capital structure and approach to the financing of the highway infrastructure PPP project

Conventionally, the finances of the PPP project in highway infrastructure can be divided into two very interrelated aspects. The first is the capital for a project development. Capital structure and the mechanism of funds attraction are the main research problems of this aspect. The second is the income derived from the operation of the project, which is used to repay the capital and operating costs, and it is revenue of the project. Sources of revenue, the mechanism and the conditions of revenue acquisition are the main research problems of this aspect.

As a rule, the capital structure is presented by a combination of equity and debt. Debt capital has advantages (tax shield and fixed claim of debt holders) and disadvantages (financial distress caused by debt obligations). Due to the attractiveness of the borrowed funds, managers tend to include debt funds into the PPP projects in highway infrastructure as much as possible. According to the trade-off theory of leverage "…firms trade off the benefits of debt financing against higher interest rate and bankruptcy costs" [13].

Defining debt as the dominant type of capital in the PPP structure of the highway project, we will focus our attention on the process of raising capital for the project. The key factor of the project attractiveness for investors and lenders is specific risk return profiles that largely depend on economic and financial characteristics of the projects, which depend on infrastructure sector and the physical infrastructure assets features. Highway infrastructure projects have the following features, which make investments in highway facilities less attractive:

- A high level of ecological and sometimes technical risks during the building time. The environmental and technical review processes can raise project costs and cause significant project delays;
- a high level of capital expenditure. Usually highway infrastructure projects require a high initial investment. Full return of the investments is expected only after a long period of time;
- a long technical life time of the facility which needs major maintenance. It needs great costs and these costs are difficult to estimate because they are expected far ahead;
- an optimal social rate rarely provides the maximum level of income taking into account necessary costs [14];
- the difficulty of cost recovery from the number of users;
- the object cannot be passed on the security for crediting;

- the depreciation period is likely to be significantly longer than the loan maturity period which, for indirect reasons, sometimes prevents cash flow after debt service being distributed in full to the shareholders;
- the project generates income after a period of time. The initial traffic revenue is unlikely to match the financing requirements during the first time of implementation of the project.

The description of the project features indicates the existence of a significant level of business risks and the likelihood of occurrence of financial distress. Therefore, the projects of highway infrastructure are not sufficiently attractive to sponsors. In order to attract private capital for such projects the government should create the conditions that will allow such projects to be financially viable. In this case, the sponsors will be willing to invest their own funds in the capital of these projects. The initial investment is large, so these projects require borrowed funds in addition to sponsors' funds. Lenders and financial institutions, by examining the characteristics of a project and its risks, will require a considerable investment from sponsors to the project prior to the issuance of the borrowed funds and all sorts of support for the project by the government throughout the period of project implementation.

The government as a partner has the right and opportunity to create the conditions in which the project will be financially viable, to participate in the financing of the project in both aspects. It can guarantee a minimum income for the project and provide part of the funds as an advance for the assets that will be transferred to the government at the expiration of the PPP agreement. This and other direct or/and indirect government assistance increase the creditworthiness of the project and guarantee the repayment of the loan. These conditions make it possible to attract sponsors' and borrowers' funds and to increase the leverage in the financing structure of the project. Cuttareeand and Mandri-Perrott [15] noted in their research that most project financing aimed to maximize gearing because debt is typically cheaper than equity. Debt-to-equity ratios of 75:25 or 70:30 have been common.

The initiator of the project is the public partner. It is the Government's responsibility to set up an appropriate financial scheme. The initiator may use two available options: Government financing and Private financing through either Corporate Finance or Project Finance [16]. The involvement of private financing is an important element of the PPP project's life cycle approach. It enables optimization of a project's total costs. The financing costs represent an essential part of the total cost. Arguments for private financing are following its more effective detection and management of project risks and the private sector's permanent access to capital markets. Therefore, further we will consider the private funding of PPP projects.

The corporate-finance approach means that the funding for the project is provided from the investor's own balance-sheet resources. Provided it can be supported by the investor's balance sheet and earning record, a corporate-finance loan to finance a project is normally fairly simple, quick, and cheap to arrange [4].

The term "Project Finance" refers to the financing of projects dependent on project cash flows for repayment, as defined by the contractual relationships within each project. All project contracts must fit together seamlessly to allocate risks in a manner which ensures the financial viability and success of the project [17]. Their major differences are summarized in Fig. 2.

The approach to financing is a crucial and determinative circumstance for raising financing. Having studied the essence of corporate and project financing and taken into account highway infrastructure project features, which are developed under the PPP conditions, we can make the following conclusion: it is reasonable to fund the project on the principles of corporate financing in case of PPPs with low level of capital investment. The approach based on the principles of project financing makes it possible to finance expensive projects with a limited recourse of assets, to carry out effective monitoring and control of project income and expenses, to transfer risks to the party which is able to manage them in the best way. Thus, the funding of the highway infrastructure project implemented under the conditions of PPP can be carried out on the basis of the Project Finance approach.

The financial strategy of the company determines the optimum level of debt and equity for a project, as well as the sources of funding, and financial instruments. It depends on a number of factors including the project, stage of development, and access to financial markets. In the following section, we will define the basis and the principles of the financial strategy of the project company implementing the project in the field of highway infrastructure construction under the PPP.

3. The basis and principles of the financial strategy of the project company

The participants of the project create a special project company (Project Company or "Special Purpose Vehicle" SPV). SPV is created only for the project implementation. It has neither financial history nor property for the pledge. It lies at the center of all the contractual and financial relationships in the PPP project and cannot carry out any other business that is not part of the project. In the event that the project defaults or

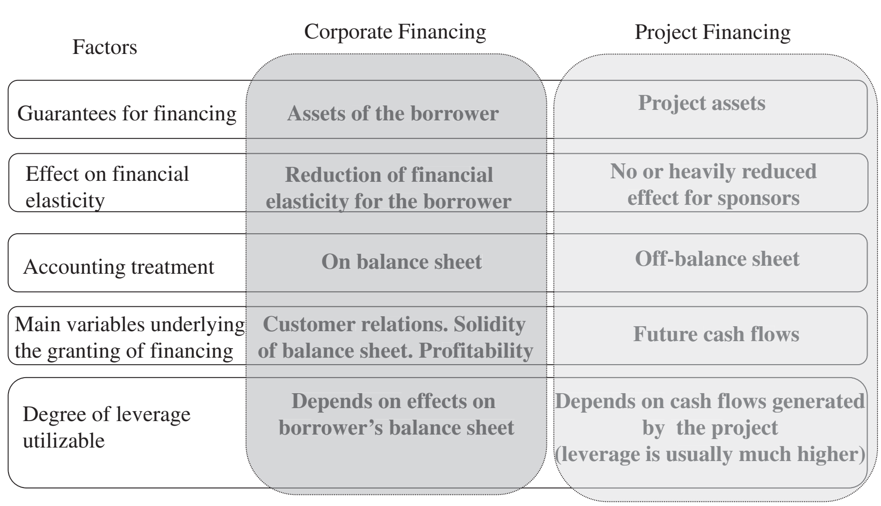

Fig. 2. Main differences between corporate financing and project financing [18].

experiences other financial difficulties, the SPV alone is responsible; the parent organizations have no obligation to be accountable for the financial performance of the project [19].

To fulfill the main goal and key functions, the most important of which is fund raising, SPV should develop a financing strategy for the project. Financial strategy of a project company is a long-term financial plan for the organization of cash flow formation, distribution and optimization, which ensures the achievement of its main goal. The financial strategy should provide a sufficient amount of capital and determine its optimal structure. The optimal capital structure, based on trade-off theory of capital structure of Brennan, Schwartz [20] and Leland [21] and other researches, is a compromise when the capital structure balances the risk of bankruptcy with the tax savings of debt. The optimal capital structure should be a target structure for the company.

Any project regardless of its kind goes through certain development phases: design stage, implementation stage and operation stage. The schedule of the project life cycle where the listed stages are highlighted is given in Fig. 3. Each stage has its purpose and objectives and requires funds for it implementation. The financial strategy based on the project life cycle should provide capital to accomplish these purposes and objectives. Sources of funds and financial instruments are selected individually for each of them under the most acceptable SPV conditions.

The life cycle analysis of the project shows the following. The project company must accumulate a certain amount of money at the design stage. Project development costs typically average about 5% of the total project cost [1]. At the implementation phase of the project, the capacity of capital is raised rapidly and potently. The volume of attracted investments with a cumulative total reaches its maximum at the time of object commissioning. From an economic standpoint, the project does not yet generate revenue, costs are incurred and paid over several years and are capitalized in the cost of construction. From a financial viewpoint, during the construction phase the project cannot generate revenue or cash inflows [18]. During the operation of the facility, the cash flows generated by the project pay off debts and generate revenues. The fairly clear-cut separation between sustaining Capex and producing positive cash flows deriving from these capital expenditures is typical in Project Finance [2]. The main stages of the highway infrastructure project life cycle, the direction of cash flows and the cash flow balance with cumulative total of the project company throughout the life cycle of the project are shown in Fig. 3.

Most experts believe that the target capital structure of the company has changed over time. The debt capital is more attractive than equity because of its cheaper cost. However, getting the debt capital at the design stage is problematic due to the insecurity of the loan. The contribution of sponsors and direct and indirect government supports allow the project company to attract a significant amount of borrowed capital required at the implementation stage of the project. Under the conditions of instability of the income, the situation can be improved through short-term borrowings that have a lower cost than a long-term loan. This will allow the company to stay afloat. In case of the successful implementation of the project, the project company receives a steady income and, for the expansion of the business, it can raise the capital by reissue of shares. Thus, the target capital structure of the project company will change over time.

The purpose of the financial strategy is to raise the necessary funds for the project by minimizing the costs of capital. The financial strategy is developed according to the following principles:

- diversification of financial sources and instruments in order to choose the most effective ones for each purpose/objective of the life-cycle stage;
- each phase of financial strategy accumulates the positive credit history and attracts the required financial resources from the available sources;
- the higher the development level of the project company is, the more opportunities it has for attraction of funds for the project;
- the balance between the benefits and costs associated with debt financing.

The following section detects a mechanism for raising funds, which is based on life cycle of the project and on the abovementioned principles, and proposes a financial strategy for raising capital, which may be typical for highway infrastructure PPP projects.

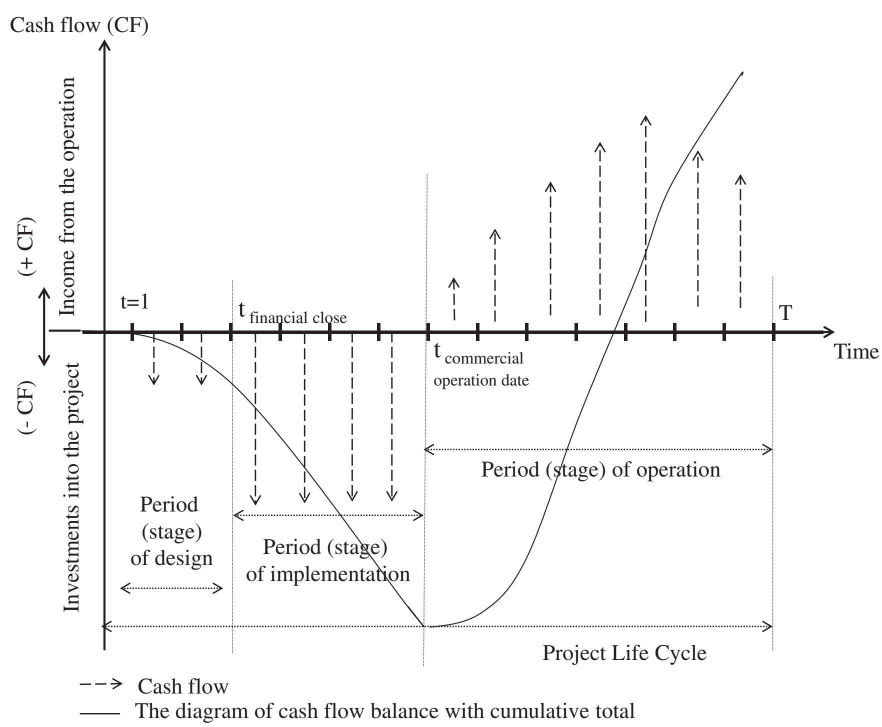

Fig. 3. Diagram of the life cycle of a PPP project.

4. Financial strategy for the PPP project

As it was mentioned above, the target capital structure of the project company is changed with the course of time. The equity prevails over the debt at the design stage of the project. The debt dominates at the implementation stage. At the operation stage, it is possible to raise the equity portion. Now we will determine the acceptable sources of funds and financial instruments for raising capital at each stage of project development.

Highway infrastructure projects have a complicated technical and environmental specification. Even typical or already implemented design of a facility requires modification due to soil-climatic and topographic characteristics of the project location. Due to this fact, a project requires some expenditure at the design stage. Therefore, in this case, it is advisable to start the realization of the financial strategy with investments of sponsors' own funds into the project. It is the simplest mechanism for capital accumulation. The amount of sponsors' own funds invested during the initial stage of the project is sufficient for activities during the design stage of the project. However, because of the limited amount of this type of financing it should be complemented by other sources over some period of time, especially at the implementation stage, because the project needs a constant inflow of major financial resources, as it is reflected in the chart of the life cycle of the project.

As mentioned above, highway infrastructure projects require high level of investment. Thus, the average investment commitment of the road subsector of infrastructure projects is $US242.3 mln.[2] Moreover, it may be difficult to raise private capital for this investment without some public-sector support. Thus, the following probable source of project financing is budget financing, which can be a sufficient source. In a PPP environment, the budget financing may take a considerable share in the capital structure. For example, in accordance with the regulations of Investment Fund of Russia, public support can be about 75% of the project costs[3] [22]. Average payment commitments to the Government connected with the road subsector infrastructure projects are about 11% of the total investment commitment[2]. Average payment commitments to the Government per project is $US26.5 mln[2]; though it should be noted that the Government seeks to reduce the volume of public financing as much as possible. Moreover, the access to public financing is very problematic, as it often requires significant time costs associated with numerous bureaucratic procedures. Funds from this source can be provided in the form of subsidies, grants, credit at preferential rate and other budget appropriations.

In its turn, bank lending may be the next potential source of financing for the Project Company. Bank lending is the most common source, widely used for investment projects financing. Therefore, in practice, the amount of funds attracted with the help of this source for different projects can vary significantly. Often the highway infrastructure projects are built in phases. Attracting capital by lending funds is suitable for such projects, because the funds can be disbursed in tranches for each stage of construction. Thus, it reduces the costs associated with interest payments on the loan.

The technology of highway construction requires different stationary and mobile equipments, which cost up to several hundred thousand dollars. Moreover, the unique technical specification of such projects may require special equipment. In this regard, the indispensable source implied by the project company financial strategy is financial leasing which allows attracting the necessary equipment at the expense of the lessor.

It is possible to use the commercial lending at a certain stage of the object readiness. Having set a stable relationship with the project company, suppliers and contractors can supply materials and raw materials to perform project works as well as to perform the work themselves with a payment delay, thus providing commercial lending. Private supplier companies that seek concessions to own or operate infrastructure facilities are more likely to apply for commercial loans [23].

The government can make an upfront payment in return of the first payment on income from the operation of the project (under availability payment or shadow toll remuneration model of the project). In case the income comes from the project users, the government can act as a potential buyer interested in acquiring the output (service), take place of the users, and make an upfront payment to the project company. This commercial credit will be paid off by collected users' charges in the first operation period. It can serve as a relatively cheap option for commercial lending without having to provide a pledge.

Gradually, there is a need to diversify financing sources with the development of the SPV and the increased scale of activities of the project. In such situation, the company, not having the possibility of entering the public capital market, may use debt securities programs. Discounts and medium term notes, bills, and letters of credit can be used for payment during the operation stage expenditure of the highway infrastructure project. It corresponds with the next level of the company development in its financial strategy. This contributes to expanding the number of creditors and the formation of a positive credit history.

The expansion of the project, for example, an increase in the length of the highway, and the increase of the number of lanes, at the stage of operation may again require some capital investments. Consistently carrying out activities, in accordance with the financial strategy, allows the project company to become known and it has a possibility to enter the public capital market to attract a greater amount of funds using mechanisms of stock market. The most common capital market instruments are the securities — shares and bonds.

The issue of bonds is justified if it is necessary to attract significant resources for a long-term period. As a rule, the bonds of PPP highway infrastructure projects are placed on investment institutions, for example pension funds. Placed on the operation stage, bonds have a lower risk, thereby a lower interest rate. The purpose of the bond issue may be the release of the initial investor's funds. The highest stage of the project company's financial strategy is initial public share offering at the capital market. This financing source can be defined as the most costly and time-consuming. It seems appropriate when the resources from other sources are insufficient, since the sale of shares implies an increase of the number of owners, which can influence the project management process. The scheme in Fig. 4 illustrates the approach described above.

The proposed financial strategy is applicable for PPP projects in highway infrastructure being developed now, as well as in the future. However, the situation on the capital market has changed. New financial instruments have appeared. The environment of raising capital has changed. For example, the economic and financial crises of the year 2008 have left a deep mark on the supply of infrastructure finance. Bond finance dried up in the wake of the breakdown of mono-line insurance, and the search for other forms of credit enhancement is still on [24]. The current situation on the capital market may require the adjustment of the financial strategy. In this case, the project company can use a special algorithm for the most rational selection of resources from the possible sources (Fig. 5).

5. Results and discussion

To structure the financing for a PPP project is a complex exercise because of the multiplicity and increasing sophistication of the financial instruments available on the market. Researchers suggested a number of conditions that should be used for choosing a source of funds. Public–Private Infrastructure Advisory Facility research workers in the

[2] Calculations are made on the basis of Investment Commitments for projects of Transport Sector Road Subsector of Infrastructure 1993–2013. PPI Project Database. PPIAF. World Bank (http://ppi.worldbank.org) Date: 04/10/2015.

[3] The government is expected to finance business projects worth at least 5 billion RUB over a five-year period. The private investor will be required to provide at least 25% of the project cost. The project profitability should be at least 4% but no more than 11%.

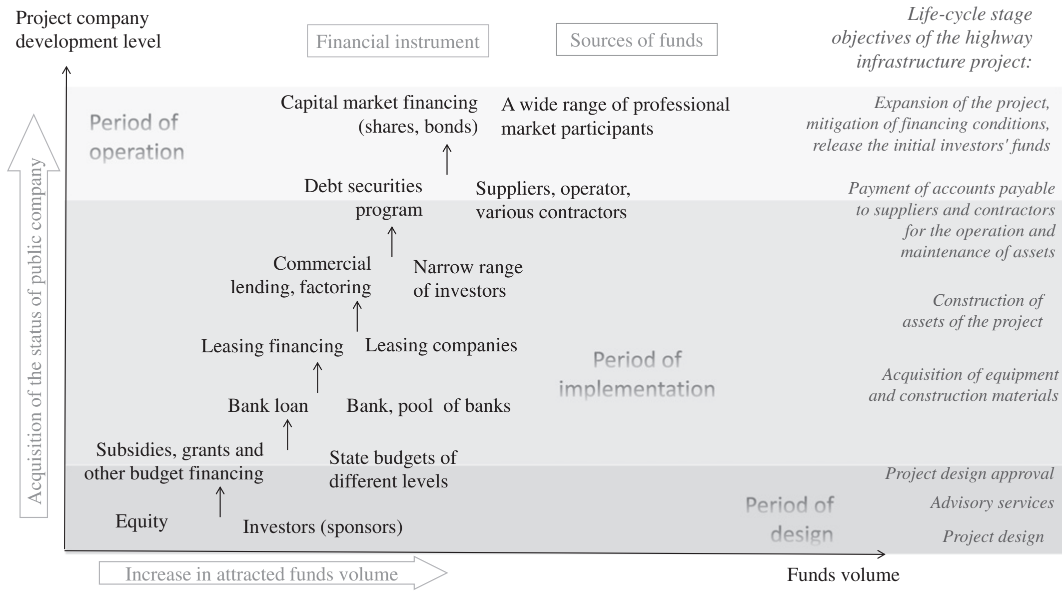

Fig. 4. The scheme of selection of the source funds according to finance strategy of the project company.

port reform toolkit [8] noted that the use of a source of finance depends on many criteria such as its cost, the type of assets to be financed, the guarantees required, flexibility of use, and conditions of acceptability by the financial market. Delmon [6] wrote "the proportion used of each source of financing and the decision as to which form of financing to adopt will depend on market availability of financing and the willingness of lenders to bear certain project risks or credit risks according to their view of how the market is developing and changing, and of their own internal risk management regime". However, they do not put them into a single financial scheme or strategy.

Case study of PPP projects in the highway infrastructure shows that the most significant sources of funds and applied financial instruments are sponsors' equity, debt capital in the form of bonds or/and loan and the government assistance of the project. The sponsor is the residual claimant and is essential to the success of the project. Thus, capital costs, as a rule, contain sponsors' equity, which is contributed at an early stage of project implementation. However, there are cases where the debt represents the entire capital of the project, but borrowers require collateral. In the case of highway infrastructure PPP projects, financing the collateral can be represented by different types of guarantee from the government or a financial institute (agency). The government can also be the borrower. For example, in the case of Highway 407 Express Toll Route in Canada, the government chose two consortia for implementation of the project [25]. Both consortia requested government loan guarantees to finance the highway. "Rather than giving guarantees, the government decided to finance the highway by borrowing itself, which it could do at the rates lower than the private sector" [26]. The proposed financial strategy takes into account the component of private capital and public financial support.

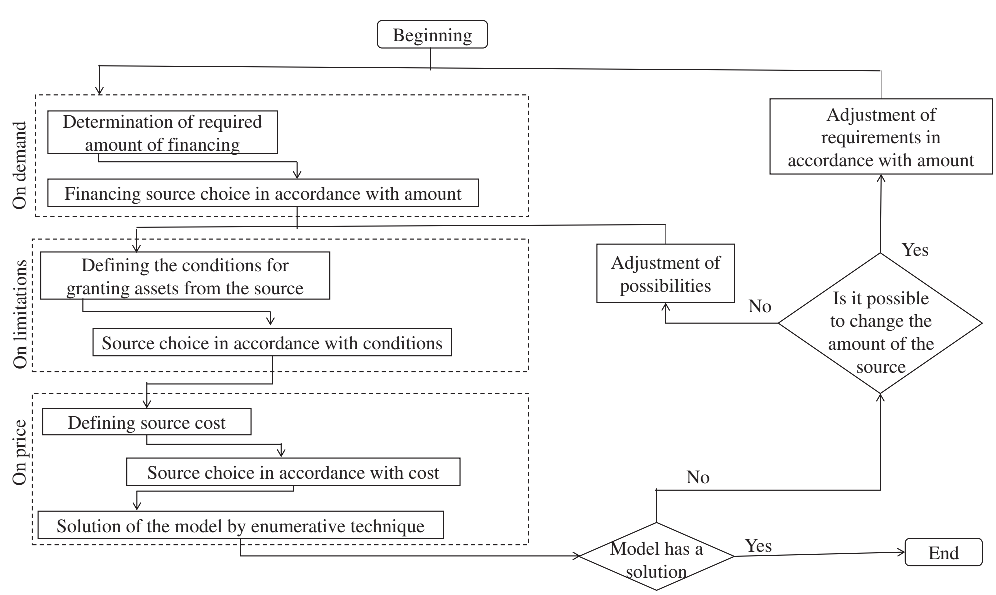

Fig. 5. The algorithm for selection of resources.

Engel, Fischer, and Galetovic [27] concluded in their study, that from a public finance perspective there is a strong presumption that PPPs are analogous to public provision — in essence, they remain public projects and should be treated as such in the government balance sheet. The Highway 407 project is an example of such collaboration of partners in financing, which has led this project to success. The proposed strategy offers the use of bank lending as the main source of capital for the construction of the project's assets for a number of reasons. Banks perform a monitoring role that can mitigate moral hazard by exercising tight control over changes to the projects contract and by scrutinizing the behavior of the SPV and its contractors.

The capital from the bond is provided in a lump sum at a fixed point in time even if the capital is required only successively depending on the construction progress of the highway project. This means that the interest burden for the borrower is higher, because interest must be paid on the full amount of the bond from the start, whereas loan interest is only payable incrementally based on the amount drawn down [28]. Raising capital through bonds is offered by the proposed strategy on the operation stage of the project, in case it is necessary.

As a rule, rating agencies provide information to investors on positive and negative situations in finance. Bondholders care only about events that significantly affect the security of the cash flows underpinning repayment. Thus, bondholders are not directly involved in the management or control of the PPP; but, usually, the project in highway infrastructure does not need total control during its operation stage.

Other financial instruments are presented in the strategy to attract debt capital in smaller amounts. However, their use provides the project with necessary capital and reduces the financial stress of the company.

The presented financial strategy effectively provides funds for all stages of the project. It takes into account the peculiarities of highway infrastructure projects and the specifics of Public–Private Partnerships. It allows the project company to create a positive credit history and optimize its debt burden. It can be recognized as a typical financial strategy for raising capital for this type of projects.

The uniqueness of PPP projects and the situation on the capital market have a significant impact on the development of the financial strategy for the project company. Therefore, the proposed sequence of financing sources and instruments is not rigidly fixed. In other words, some of the presented sources can be attracted at the same time, or cannot be used at all, or they can change their positions in the financial strategy of the project company.

However, considering the abovementioned, project financing sources shall be placed exactly in this sequence as the investment of funds by each of them increasing the possibility of attracting funds from each subsequent source by the project company.

6. Conclusion

The financial strategy presented in this paper is based on the life cycle of the project that uses the Project Finance approach, takes into account the specific financial features of projects in the highway infrastructure, as well as the PPP conditions of the implementation of these projects. The purpose of the financial strategy is the provision of capital for the objectives of each stage of the project implementation from the most appropriate source with the most appropriate financial instruments. The capital from different sources should be applied with suitable financial instruments at the most appropriate time during the life cycle of the project. The strategy creates a positive credit history and balance of the benefits and costs associated with debt financing. For adjustment of the financial strategy, we suggest using the algorithm of the funds' source selection which helps to make a choice in favor of a source on the basis of several criteria and is aimed at the minimization of costs for debt service.

The proposed strategy can be used as a typical financial strategy for the project company to raise capital for PPP projects in highway infrastructure. The use of the typical financial strategy that has already passed the preliminary study and preparation allows taking into account the typical features of the highway infrastructure projects and gives the opportunity to optimize the amount of capital expenditures of the project, and to substantiate the capital structure more thoroughly. It facilitates the process of its preparation and settlement of disputes between the partners, thereby reducing costs and time of the conclusion of the agreement.

The next step of this study will be the following: the analysis and generalization of practical experience of project companies to attract capital and the comparison of the efficiency of the proposed strategy and the one applied by the project company in practice based on the data of this project. Such study would help to fit the obtained results with the actual conditions of the project implementation.

Acknowledgments

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